

7. BLOCK ISLAND SOUND

(1) This chapter describes Block Island Sound, Fishers Island Sound, Gardiners Bay, Little Peconic Bay, Great Peconic Bay, and the ports and harbors in the area, the more important of which are Point Judith Harbor, Great Salt Pond, Stonington, Mystic Harbor, and Greenport.

(2) **COLREGS Demarcation Lines.**—The lines established for this part of the coast are described in **80.150 and 80.155**, chapter 2.

(3) **Charts 13205, 13215.—Block Island Sound** is a deep navigable waterway forming the eastern approach to Long Island Sound, Fishers Island Sound, and Gardiners Bay from the Atlantic Ocean. The sound is a link for waterborne commerce between Cape Cod and Long Island Sound. It has two entrances from the Atlantic; an eastern entrance from Rhode Island Sound between Block Island and Point Judith, and a southern entrance between Block Island and Montauk Point. The sound is connected with Long Island Sound by The Race and other passages to the south-westward, and with Fishers Island Sound by several passages between rocky reefs from Watch Hill Point to East Point, Fishers Island.

(4) The north shoreline of Block Island Sound and Fishers Island Sound from Point Judith to New London is generally rocky and broken with short stretches of sandy beach. Many inlets and harbors, especially in the vicinity of Fishers Island, afford harbors of refuge for vessels. Most of the rocks and shoals near the channels are marked with navigational aids.

(5) The southern part of Block Island Sound is bounded by Block Island on the east, the eastern extremity of Long Island, and Gardiners Island on the west. Plum Island and Fishers Island are at the western end of the sound.

(6) The deep water in the central part of Block Island Sound will accommodate vessels of the greatest draft.

(7) Westward of Gardiners Island, enclosed between the northeastern and eastern ends of Long Island, are Gardiners Bay, Shelter Island Sound, Little Peconic Bay, and Great Peconic Bay. This area is well protected but generally shallow, and is not suited for deep-draft vessels. The shoreline is marked by many indentations and shallow harbors. These waters are much used by commercial fishing vessels and small pleasure craft because of the protection afforded and the many anchorages.

(8) **Block Island North Reef** is a sand shoal with depths of 14 feet or less extending 1 mile northward from **Sandy Point** at the north end of Block Island. The shoal should be avoided by all vessels; its depths change frequently, and its position is also subject to a slow change. It is practically steep-to on all sides, so that soundings alone cannot be depended on to clear it. A lighted bell buoy is 1.5 miles northward of the point.

(9) **Southwest Ledge**, 5.5 miles west-southwestward of Block Island Southeast Light, has a least known depth of 23 feet and is marked on its southwest side by Southwest Ledge Lighted Bell Buoy 2. Rocky patches with least depths of 27 and 29 feet extend 1.5 miles northeastward from the ledge. The sea breaks on the shoaler places on the ledge in heavy weather.

(10) Several other dangers that must be guarded against are northward and westward of Southwest Ledge Lighted Bell Buoy 2. These dangers are: 33-foot sounding, marked by a lighted buoy, about 2.2 miles 280° from the lighted bell buoy; and two

obstructions, cleared to a depth of 35 feet, about 0.75 mile north of the lighted bell buoy.

(11) The deepest passage in the southern entrance to Block Island Sound is just westward of Southwest Ledge and has a width of over 2 miles; this is the best passage for deep-draft vessels. In heavy weather vessels desiring to enter the sound westward of Block Island should pass westward of Southwest Ledge Lighted Bell Buoy 2, taking care to pass clear of the rocky ledge.

(12) Between the inner patch of rocks and the shoals, which extend 0.9 mile from Block Island, is a channel 1.3 miles wide, with a depth of about 34 feet. Vessels using this channel should round the southwest end of Block Island at a distance of 1.5 miles. It is not advisable to use this passage during heavy weather.

(13) The entrance between Point Judith and Block Island is used by vessels coming from the bays and sounds eastward to Long Island Sound. The route generally used is through The Race. Tows of light barges and vessels of 14 feet or less draft sometimes go through Fishers Island Sound, especially during daylight with a smooth sea. This entrance is clear with the exception of Block Island North Reef and the numerous large boulders extending about 4 miles south-southeastward of Point Judith. The coast from Point Judith nearly to Watch Hill should be given a berth of over 1 mile, avoiding the broken ground with depths less than 30 feet.

(14) (Full tidal information, including daily predictions is given in the Tide Tables.)

(15) The effect of strong winds, in combination with the regular tidal action, may at times cause the water to fall several feet below or rise the same amount above the plane of reference of the chart. The mean range of **tide** throughout Block Island Sound varies from about 3 feet at Point Judith to 2 feet at Montauk Point.

(16) **Tidal current** data for a number of locations in Block Island Sound are given in the Tidal Current Tables. Current directions and velocities throughout the sound for each hour of the tidal cycle are shown on Tidal Current Charts, Block Island Sound and Eastern Long Island Sound.

(17) The tidal currents throughout Block Island Sound have considerable velocity; the greatest velocities occur in the vicinity of The Race and in the entrances between Montauk Point, Block Island, and Point Judith. Soundings alone cannot be depended upon to locate the position; the shoaling is generally abrupt in approaching the shores or dangers.

(18) In the middle of the passage between Point Judith and Block Island, the velocity is 0.7 knot. The flood sets westward, and the ebb eastward.

(19) In the passage between Block Island and Montauk Point, the flood sets generally northwestward and the ebb southeastward. In the middle of the passage the velocity is 1.5 knots on the flood and 1.9 knots on the ebb. About 1.2 miles eastward of Montauk Point, the flood sets 346°, ebb 162°, with a velocity of 2.8 knots.

(20) In Block Island Sound and in the eastern part of Long Island Sound, **fogs** are generally heaviest with southeast winds. In these waters the usual duration of a fog is from 4 to 12 hours, but periods of from 4 to 6 days have been known with very short clear intervals. In the autumn, **land fogs**, as they are termed locally, sometimes occur with northerly breezes, but are generally burned off before midday.

(21) The Race may be said to be the only locality where tidal currents have any decided influence on the movements of the ice. Large quantities of floe ice usually pass through The Race during the ebb, especially if the wind is westerly, and in severe winters this ice causes some obstruction in Block Island Sound and around Montauk Point. These obstructions are the most extensive around the middle of February.

(22) **Weather, Block Island Sound and vicinity.**—Land influences the weather only at the northern edge of the Sound, with a northerly wind. Otherwise the waters are open, similar to the nearby ocean. Winds from all other directions have ample time to increase in strength and the Sound can be as turbulent as any water off the coast. Wind speeds can be double those found on the coast, especially in winter, when average speeds of 16 to 17 knots are common. Gales occur up to 5 percent of the time in winter and are most likely from the west and northwest. Seas built by winds from the southeast through southwest are usually highest since there is no land to interfere with the fetch. Seas of 10 feet (3 m) or more are likely 5 to 7 percent of the time in winter.

(23) Because of relatively cold water, summer fog occurs two to three times more often in these waters than in either Narragansett or Buzzard Bays. For example, in June visibilities drop below $\frac{1}{2}$ mile nearly 9 percent of the time.

(24) **Pilotage, Block Island Sound and Long Island Sound.**—Pilotage is compulsory for foreign vessels under register in Block Island Sound and Long Island Sound. A vessel traversing Block Island is enroute to or from Long Island Sound. See Pilotage, Long Island Sound (indexed as such), chapter 8. Vessels bound for Long Island Sound ports may board pilots in the vicinity of Point Judith Lighted Whistle Buoy 2, within a 1-mile radius circle centered in $41^{\circ}17.2'N.$, $71^{\circ}30.4'W.$

(25) **Chart 13217.—Block Island,** 5 miles long, is hilly with elevations up to about 200 feet. The shore of the island is fringed in most places by boulders and should be given a berth of over 0.5 mile even by small craft; the shoaling is generally abrupt in approaching the island.

(26) **Weather, Block Island and vicinity.**—Block Island, formed by glaciers, consists of nearly 7,000 acres (2,830 hectares) and lies in the Atlantic Ocean about 12 miles east-northeast of Long Island and about the same distance south of Charlestown, RI. Hence, the climate is typically maritime, but under conditions of extreme cold or heat the effect is felt on the island as well as on the mainland. Temperatures of $-10^{\circ}F$ ($-23.3^{\circ}C$, February 1992) and $95^{\circ}F$ ($35^{\circ}C$, August 1948) have been recorded.

(27) Summers are usually dry. Recorded rainfall for any one month ranges from a trace to 11.51 inches (292 mm). November is the wettest month averaging 4.08 inches (104 mm) and June is the driest averaging 2.46 inches (64 mm).

(28) The warmest month is July with an average high of $76.5^{\circ}F$ ($24.7^{\circ}C$) and an average low of $63.7^{\circ}F$ ($17.6^{\circ}C$). The coolest months are January and February. Each average $32^{\circ}F$ ($0^{\circ}C$). The island is too small to build up cumulonimbus clouds, and local thunderstorms do not occur. Fog occurs on one out of four days in the early summer, when the ocean is relatively cold and foggy days average about 22 each year.

(29) Winters are distinguished for their comparative mildness, maximums average $36^{\circ}F$ to $42^{\circ}F$ ($2.2^{\circ}C$ to $5.6^{\circ}C$) and minimums average $26^{\circ}F$ ($-3.3^{\circ}C$) in January and February. Since the surface winds are usually easterly when snow begins it soon changes to

rain or melts rapidly after it piles up. The ocean temperatures are of course always somewhat above freezing and not far off shore are relatively high.

(30) The ocean has a dampening effect on hot winds in summer and an accelerating effect on cold winds from the mainland in the winter. Katabatic winds from Narragansett Bay and Long Island reach as high as 35 knots when anticyclonic conditions prevail on the mainland in winter. The wind velocity averages 15 knots for the year, but the mean is 17 knots in the winter, when gales are frequent. In the early fall most of the tropical storms moving up the coast affect the island to some extent. Since 1871, 13 storms have come within 25 miles of Block Island. The most recent was Hurricane Bob in August 1991. The center of Hurricane Bob passed about ten miles to the west of the island with 85-knot winds.

(31) (See page T-4 for **Block Island climatological table.**)

(32) **Communications.**—A ferry operates daily from Galilee to Great Salt Pond or Old Harbor, carrying mail, passengers, freight, and vehicles. There is summer ferry service from Old Harbor to Providence, via Newport, and to New London. The island has telephone service to the mainland. Air service is also available.

(33) **Block Island Southeast Light** ($41^{\circ}09.2'N.$, $71^{\circ}33.1'W.$), 261 feet above the water, is shown from a steel tower on **Mohegan Bluffs** on the southeast point of the island.

(34) About 0.2 mile southeast of the light is the wreck of the large tanker SS LIGHTBURNE. The wreck is marked by a buoy. At **Clay Head**, on the northeast side of Block Island, is a lone white house on top of the bluff. Two nearby silos are conspicuous.

(35) **Block Island North Light** ($41^{\circ}13.7'N.$, $71^{\circ}34.6'W.$), 58 feet above the water, is shown from a black tower on a gray granite dwelling on Sandy Point at the north end of the island.

(36) **Old Harbor**, frequently used as a harbor of refuge, is an artificial harbor formed by two breakwaters on the east side of Block Island, 1.4 miles northward of Block Island Southeast Light. In June 2000, the controlling depths were 13 feet in the entrance channel; thence 12 to 15 feet in the inner harbor anchorage with lesser depths along the edges, thence 13 to 15 feet were available in the basin in the southeast corner of the inner harbor. The harbor is occupied by pleasure craft during the summer. The eastern part of the inner harbor is left clear for the passage of the ferry to the wharf. The basin in the southeast corner of the inner harbor is usually occupied by fishing boats and local craft which tie up along the sides. Gasoline, diesel fuel, and berths are available. The **harbormaster** has an office at the Old Harbor town dock.

(37) The east breakwater extends about 300 yards northward of the entrance of the inner harbor, and is marked at its end by a light and fog signal. A bell buoy is 0.55 mile northward of the breakwater. A light marks the end of the breakwater on the west side at the entrance to the inner harbor.

(38) **Great Salt Pond (New Harbor)**, on the west side of Block Island, is the best harbor in Block Island Sound for vessels of 15-foot draft or less. In easterly gales when the sea is too heavy to enter Old Harbor, a landing can be made at Great Salt Pond. The entrance, about 2 miles south-southwestward of Block Island North Light, is a dredged cut through the narrow beach. The southwestern side of the entrance is protected by a jetty, which is marked by a light and a fog signal at its outer end.

(39) In September 2000, the controlling depth were 13 feet in the left half and 11 feet in the right inside quarter of the entrance channel. Gradual shoaling to 1 foot or less occurs in the right outside quarter, about midway between Buoy 10. Local knowledge is advised before entering.

(40) The usual anchorage in Great Salt Pond is near the south-east end, off the ferry landing, in 15 to 48 feet, taking care to leave a fairway to the landing. A channel with a reported depth of about 8 feet in July 1981 leads to **Trim Pond**, where local fishing craft are moored.

(41) Small-craft facilities in Great Salt Pond can provide berths, electricity, gasoline, diesel fuel, water, ice, and marine supplies. The marina about 0.3 mile westward of the ferry landing had a reported depth of 16 feet at the face of the dock in July 1981. Sail and engine repairs are available nearby.

(42) The mean range of **tide** is about 2.6 feet.

(43) **Tidal currents** in the entrance to Great Salt Pond have a velocity of 0.3 knot. (See Tidal Current Tables for predictions.)

(44) **Chart 13219.—Point Judith Light** (41°21.7'N., 71°28.9'W.), 65 feet above the water, is shown from an octagonal tower, 51 feet high, with the lower half white, upper half brown. The station has a fog signal. About 100 yards north of the light is **Point Judith Coast Guard Station**. A lighted whistle buoy is about 2.4 miles southward of the light. (See chart 13218.)

(45) The area around Point Judith, including the approaches to Point Judith Harbor of Refuge, is irregular with rocky bottom and indications of boulders. Caution is advised to avoid the shoal spots, even with a smooth sea, and to exercise extra care where the depths are not more than 6 feet greater than the draft.

(46) **Point Judith Harbor of Refuge**, on the west side of Point Judith, is formed by a main V-shaped breakwater and two shorearm breakwaters extending to the shore. The harbor is easy of access for most vessels except with a heavy southerly sea. It is little used by tows. The only soft bottom in the harbor is found in the southern part of the deeper water enclosed by the main breakwater. On the north side the shoaling is gradual; the 18-foot curve is about 0.3 to 0.5 mile offshore.

(47) Near the central part of the harbor are two shoals; the northernmost one has depths of 14 to 18 feet, and the southernmost one has depths of 14 to 16 feet and is marked by a buoy.

(48) The area within the V-shaped breakwater affords protected anchorage for small craft. The breakwater should be given a berth of 200 yards to avoid broken and hard bottom; a rocky shoal area about 100 yards wide, paralleling the west side of the main breakwater northward from the angle should be avoided. A good berth for a vessel is on a line between Point Judith Harbor of Refuge East Entrance Light 3 and Point Judith Harbor of Refuge West Entrance Light 2, midway between them in 22 to 30 feet. This position falls on the edge of the east-west thoroughfare used by pleasure craft and fishing boats.

(49) In August 1984, a submerged obstruction was reported about 270 yards southeast of Point Judith Harbor of Refuge West Entrance Light 2 in about 41°21'37"N., 71°30'40"W. A dangerous wreck, covered 4½ feet, is about 450 yards westward of Point Judith Harbor of Refuge East Entrance Light 3 in 41°21.6'N., 71°29.1'W.

(50) The southern entrance to the Harbor of Refuge, known locally as the East Gap, is 400 yards wide; in July 1981, it had a reported controlling depth of about 24 feet with deeper water in the western half of the channel.

(51) The western entrance to the Harbor of Refuge, known locally as the West Gap, is 500 yards wide; in July 1981, it had a reported controlling depth of about 18 feet, with lesser depths on the north side of the entrance.

(52) **Tides and Currents.**—The mean range of tide in the Harbor of Refuge is 3.1 feet. The tidal currents have a velocity of about 0.7 knot at the south entrance. The currents off the west entrance are rotary, with a velocity at strength of 0.5 knot. (See Tidal Current Tables for predictions.)

(53) Considerably stronger currents have been reported to develop especially when the tide is ebbing.

(54) **Point Judith Pond** is a saltwater tidal pond entered between two rock jetties at **The Breachway** in the northwestern part of Point Judith Harbor of Refuge. The east jetty is marked near its seaward end by a daybeacon. The pond extends 3.3 miles northerly to the town of **Wakefield**. It is used extensively by small fishing vessels and pleasure craft, and numerous fish wharves are inside the entrance. The north end of Point Judith Pond affords good anchorage for boats of 4 feet draft or less during a heavy blow.

(55) The village of **Galilee** on the east side of the entrance and **Jerusalem** on the west side at **Succotach Point** have State piers and numerous small piers chiefly used by fishermen. A State fisheries laboratory is just above the State pier at Jerusalem. A State pier superintendent controls the State piers at Galilee and Jerusalem; his office is at the head of the Galilee State Pier.

(56) A channel with three dredged sections marked by buoys and a daybeacon extends from Point Judith Harbor of Refuge along the west side of the pond to the State Pier at Jerusalem, and thence northerly to the turning basin at Wakefield. A branch channel, on the east side, extends northeasterly from the entrance to the pond to the State Pier at Galilee, and into anchorage areas westward of Galilee and southward of Little Comfort Island.

(57) In February 1983, the controlling depths were 11 feet (13 feet at midchannel) to the junction with the Galilee branch channel, thence 11 feet to the State Pier at Jerusalem, thence in December 1985, 4½ feet to the turning basin at Wakefield with 6 feet in the basin except for shoaling to 5 feet along the west limit. In February 1983, the east branch channel had a controlling depth of 15 feet to the State Pier at Galilee, thence 11 feet (14 feet at midchannel) to the anchorage basin southward of Little Comfort Island, thence in October 1985, depths of 4½ to 7 feet were available in the anchorage except for shoaling to 1½ feet along the northeast limit. In February 1983, the anchorage westward of Galilee had depths of 10 feet.

(58) **Tides and Currents.**—The mean range of tide in the pond is 2.8 feet and occurs later than in the Harbor of Refuge by about 10 minutes just inside the entrance and 30 minutes at the north end. The tidal currents in the entrance have a velocity of 1.8 knots on the flood and 1.5 knots on the ebb, and cause slight rips and overfalls at changes of tide. Higher current velocities are reported to occur. (See Tidal Current Tables for predictions.)

(59) Several boatyards and marinas are at Galilee, Jerusalem, Wakefield, and at Snug Harbor, on the west side of the pond about 0.8 mile above the entrance. Berths, electricity, gasoline, diesel fuel, water, ice, marine supplies, storage, launching ramps, and hull and engine repairs are available. The largest marine railway in the area, at the southern end of the waterfront at Snug Harbor, can handle craft up to 150 feet long or 400 tons. In July 1981, a reported depth of 12 feet could be carried to the railway.

(60) Daily ferry service is available to Block Island from Galilee. Daily bus service is operated to Providence.

(61) **Potter Pond**, shallow and landlocked, is joined with Point Judith by a narrow channel near **Snug Harbor**. Local knowledge should be obtained before using this channel, which has depths of 2 to 4 feet and is crossed by overhead power and telephone cables with a clearance of 30 feet at the channel entrance and by a fixed highway bridge with a clearance of 5 feet about 0.4 mile above the entrance. A current of more than 3 knots develops through the channel on the ebb. The mean range of **tide** in the pond is about 1 foot, and it occurs about 2.5 hours later than in the Harbor of Refuge.

(62) **Chart 13215**.—From Point Judith to Watch Hill the shore is low and for the most part consists of sandy beaches which are broken by several projecting rocky points. Back from the immediate shore are areas of cultivation interspersed with rolling grass-covered or wooded hills. Except for Point Judith Pond, most pond outlets are used only by small local craft. The coast is fringed by broken ground and boulders in places, which should be avoided by deep-draft vessels where the depths are less than 36 to 42 feet.

(63) **Matunuck** is a summer resort about 3 miles west of Point Judith. Southwest of **Matunuck Point** is **Nebraska Shoal**, a patch of boulders covered 18 feet and marked by a buoy. The shoal is at the south end of broken ground, with depths less than 30 feet offshore; the water deepens abruptly around the patch.

(64) **Charlestown Breachway**, 4.5 miles westward of Matunuck Point, is a narrow inlet which leads to **Ninigret Pond**,



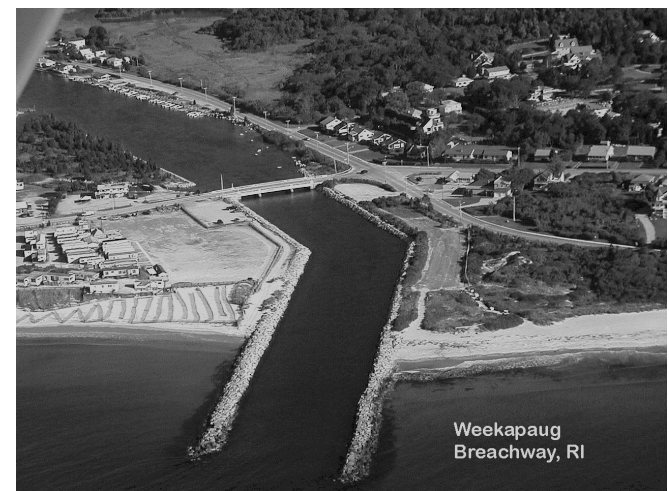
also known as **Charlestown Pond**, to the westward, and the village of **Charlestown** to the northward. In 1994, a reported depth of about 1½ feet could be taken in the inlet, with depths of about 3 to 6 feet inside. The southern part of Ninigret Pond is mostly mud flats. Local knowledge is required in entering and moving about inside. A small-craft facility is at Charlestown, and one is at the western end of Ninigret Pond; berths, gasoline, electricity, marine supplies, and launching ramps are at both facilities.

(65) **Quonochontaug**, 10.8 miles westward of Point Judith, is a summer settlement at the outlet of **Quonochontaug Pond**. In July 1981, a reported depth of about 3 feet could be carried in **Quonochontaug Breachway**, with depths of 15 to 20 feet re-

ported in the pond. Vessels favor the west side of the entrance to avoid rocks in the easterly half of the entrance.



(66) **Weekapaug Point**, 12.5 miles west of Point Judith, is bold, rocky, and prominent from the southwest and southeast. Two stone jetties, 1,500 feet long, protect the entrance to **Winnapaug Pond** just westward of the point. In July 1981, a reported depth of about 5 feet could be carried in **Weekapaug Breachway** to the pond; vessels favor the west side of the breachway above the bridge. Reported depths in Winnapaug Pond vary from bare to 10 feet. There are numerous shoals and sandbars. Southerly winds cause breakers at the ends of the jetties; extreme caution is advised. The fixed bridge over the entrance has a clearance of 6 feet.



(67) **Old Reef**, with a depth of 5 feet over it, is about 1.5 miles west of Weekapaug Point and about 0.5 mile offshore.

(68) **Chart 13214**.—**Watch Hill**, about 17.5 miles west of Point Judith, is a high bare bluff on its easterly side with several large hotels and summer houses.

(69) **Watch Hill Light** (41°18.2'N., 71°51.5'W.), 61 feet above the water, is shown from a square gray granite tower, 45 feet high, attached to a white building with a red roof, on **Watch Hill Point**.

It is reported that the fog signal at the station is not easily heard eastward of the light, but from the southwest can be heard nearly to Montauk Point. A radiobeacon is 136 yards north-northeast of the light. A lighted whistle buoy, 2.5 miles southward of the light, marks a passage through Block Island Sound.

(70) **Gangway Rock**, awash at low water, is part of a boulder reef extending about 0.2 mile southward from Watch Hill Light. A lighted bell buoy marks the south end of the reef. A submerged rock is about 50 yards northward of the buoy.

(71) **Watch Hill Passage** is the principal entrance to Fishers Island Sound from eastward, and the only one used by strangers. It has a least depth of about 17 feet. A spot with 12 feet over it in the passage is marked by a buoy; the best channel is northward of this buoy, giving it a berth of about 150 yards.

(72) **Watch Hill Reef**, on the southwest side of Watch Hill Passage, has rocks that bare and is marked by a gong buoy.

(73) **Sugar Reef Passage**, between Watch Hill Reef and Sugar Reef, has a width of 0.3 mile; the least depths are about 22 feet.

(74) **Sugar Reef**, some 500 to 600 yards in extent, is covered 2 to 12 feet and should be avoided; it is marked by a buoy off its north side.

(75) **Catumb Passage**, between Sugar Reef and Catumb Rocks, has a width of 150 yards; its least depth is 13 feet.

(76) **Catumb Rocks**, the highest of which are awash, are marked by buoys on the north, southeast, and southwest sides. Rocks covered 1 to 18 feet extend 0.8 mile westward of Catumb Rocks to the buoy that marks the east side of **Lords Passage**. This passage, about 0.3 mile wide, has a least depth of 16 feet.

(77) **Wicopesset Rock**, on the northwesterly side of Lords Passage, is the easterly part of foul ground extending about 0.3 mile to **Wicopesset Island**, which is low and rocky.

(78) **Wicopesset Passage**, between Wicopesset Island and East Point, is narrow and is obstructed by a rock in the middle marked by a buoy; it is suitable only for small craft and should not be used by strangers. A bell buoy marks the southern entrance. Extreme caution is recommended when using the passage as the ebb current is apt to set boats on the foul ground.

(79) Information about the tides and tidal currents in the passages is given with the discussion of Fishers Island Sound.

(80) **Charts 13214, 13212.—Fishers Island**, 6 miles long, is hilly and sparsely wooded. **Chocomount**, 136 feet high, is the highest point on the island. **East Point**, at the east end of the island, is marked by several large houses. The former Coast Guard station at East Harbor, about 1 mile from East Point of Fishers Island, is prominent; numerous buildings on the western part of Fishers Island and a large yellow hotel building are conspicuous. The radar antenna on **Mount Prospect**, near the west end of the island, south shore, is the most prominent landmark on Fishers Island from seaward. The south side of the island is fringed with foul ground which rises abruptly from depths of 42 to 48 feet; but by giving the shore a berth of 0.5 mile, all dangers will be avoided.

(81) **Race Point Ledge**, partly bare at low water, extends about 0.2 mile southwestward from **Race Point**, the southwest extremity of Fishers Island, and is marked at its end by a buoy. Inside the buoy are boulders with 2 to 9 feet over them. The passage between the buoy and Race Rock Light has very irregular bottom; the least depth is about 24 feet. It is suitable only for small vessels with a comparatively smooth sea.

(82) **Race Rock**, on the northeast side of The Race, is nearly 200 yards in diameter, with a depth of 8 feet. A ridge with a least depth of 25 feet is reported extending about 370 yards south of Race Rock. Mariners should use caution when transiting just SSW of Race Rock as this area has been reported to have much lesser depths than 25 feet. Another ridge, oriented north-south and with a least depth of 40 feet, is about 380 yards east of Race Rock.

(83) **Race Rock Light** (41°14.6'N., 72°02.8'W.), 67 feet above the water, is shown from a granite tower attached to a dwelling on a granite pier on the rock. A fog signal is sounded at the station. The fog signal is reported at times to be inaudible when a vessel is approaching from eastward and is close southward of Fishers Island.

(84) **Charts 13209, 13212.—The Race**, the main entrance to Long Island Sound from eastward, extends between Fishers Island and Little Gull Island, between which is a width of about 3.5 miles. The only dangers are Valiant Rock, nearly in the middle, and Little Gull Island with its reefs.

(85) **Current.**—In the middle of The Race, the flood sets 295° and the ebb 100°, with average velocities of 2.9 knots and 3.5 knots, respectively. There are always strong rips and swirls in the wake of all broken ground in The Race, except for about one-half hour at slack water. The rips are exceptionally heavy during heavy weather, and especially when a strong wind opposes the current, or the current sets through against a heavy sea. (Predicted times of slack water and times and velocities of strength of current are given in the Tidal Current Tables.)

(86) **Little Gull Reef**, with little depth over it and foul ground, extends 0.3 mile east-northeastward from **Little Gull Island**. Deep-draft vessels should avoid this locality. **Little Gull Island Light** (41°12.4'N., 72°06.5'W.), 91 feet above the water, is shown from a gray granite tower, 81 feet high, attached to a red dwelling on a pier. A fog signal is at the light. The light and Race Rock Light are the guides, as soundings cannot be depended upon.

(87) In passing north of Valiant Rock, vessels should keep from 0.5 to 0.8 mile southwestward of Race Rock Light, and craft passing southward of Valiant Rock should hold to a course about 1 mile northeastward of Little Gull Island Light.

(88) **Cerberus Shoal**, 6 miles southeast of Race Rock Light, is about 0.4 mile in diameter, with a least depth of 19 feet on a small rocky patch near its north end. The seas break on this shoal during heavy swells. It is marked by a lighted gong buoy. Near the shoal, tide rips are unusually strong.

(89) **Great Gull Island**, 0.6 mile southwest of Little Gull Island, was formerly a military reservation, but is now privately owned. The pier on the north side is in ruins. A lookout tower on the island is conspicuous.

(90) **Valiant Rock**, with a least depth of 19 feet, is surrounded by shoal area, and the 10-fathom curve surrounding the rock marks the area which should be avoided by deep-draft vessels and preferably all vessels, on account of the heavy swirls and rips. A lighted bell buoy is northward of the rock.

(91) **The Sluiceway**, the passage between Great Gull Island and Plum Island, has several known dangers and very irregular bottom with boulders, and should be avoided. The velocity of the **tidal current** in the passage is 2.6 knots on the flood, and 3.2 knots on the ebb; flood sets 299°, and ebb 133°. Considerably higher velocities occur at times, and tide rips are very bad in heavy weather. Boulders covered 3 to 10 feet are between **Old**

Silas Rock and Plum Island. Old Silas Rock is awash at high water. **Middle Shoal Rock**, 0.3 mile northeastward of Old Silas Rock, has a depth of 8 feet.

(92) **Bedford Reef** is broken ground, on which the least found depths are 14 to 16 feet, extending about 1.5 miles southward from broken ground lying between Great Gull and Plum Islands. It should be avoided. **Constellation Rock**, on the southeasterly extension on this broken ground, has 17 feet over it, is marked by a buoy, and lies 1.9 miles southward of Little Gull Island Light.

(93) **Chart 13209.—Montauk Point**, the easterly extremity of Long Island, is a high sandy bluff, on the summit of which is the light. The land is grass covered, with a height of 165 feet at **Prospect Hill**, 2 miles westward of the point. The south side of the point is bold, the 10-fathom curve is about 0.5 mile from shore; depths of 24 feet and less extend 0.8 mile off the northeast side of the point.

(94) **Montauk Point Light** (41°04.3'N., 71°51.4'W.), 168 feet above the water, is shown from a white octagonal, pyramidal tower with a brown band midway of its height and a covered way to a gray dwelling. A fog signal is at the light. A radiobeacon is 0.3 mile south-southwestward of the light.

(95) Surrounding Montauk Point for about 4 miles is a shoal area that has been closely surveyed (see also chart 13215); the bottom is very broken, and extra caution should be observed where the depths are less than 10 feet greater than the draft. In general, the shoals are a series of long narrow ridges, in places only a few yards wide, and their positions are indicated by the rips over them at the strength of the tidal currents.

(96) **Montauk Shoal**, about 2.5 miles south-southeastward of the light, has least depths of 28 feet. **Great Eastern Rock**, 1.5 miles east-northeast of the light, has a least depth of 25 feet. **Phelps Ledge**, just northerly of Great Eastern Rock, is covered by 24 feet. **Endeavor Shoals**, about 2.3 miles northeast of the light, are covered by 19 to 24 feet on a narrow ridge about 0.4 mile long. A lighted gong buoy is off the eastern end of the ridge.

(97) Vessels drawing up to 20 feet can avoid the dangers eastward and northeastward of Montauk Point in smooth weather by giving the point a berth of over 1 mile and avoiding Great Eastern Rock.

(98) Broken ground with rocky bottom and boulders extends about 2 miles off the north coast west of Montauk Point. **Shagwong Reef**, with a least depth of 8 feet and marked by a lighted bell buoy, is the northern limit of this area. **Shagwong Rock**, with a least depth of 7½ feet and marked by a lighted buoy, and **Washington Shoal**, with a least depth of 15 feet, are between the shore and Shagwong Reef. The principal danger outside Shagwong Reef is a shoal with a depth of 30 feet, 5.3 miles northwestward of Montauk Point.

(99) **Pilotage Pickup Locations Off Montauk Point.**—Pilots generally, or by prearrangement, meet a ship “off Montauk Point”. The following pilot associations meet vessels “off Montauk Point” at the locations indicated. For telephone number, FAX number, cable address, description of the boat, frequencies, etc., consult the name of the association under Pilotage, Narraganset Bay and Other Rhode Island Waters (indexed as such), chapter 6; Pilotage, Long Island Sound (indexed as such), chapter 8; and Pilotage, New York Harbor and Approaches (indexed as such), chapter 11.

(100) Sound Pilots, Inc. (division of Northeast Marine Pilots, Inc.), 2 miles east of Montauk Point Lighted Whistle Buoy MP;

(101) Connecticut State Pilots, 3 miles east-southeast of Montauk Point Lighted Whistle Buoy MP;

(102) Constitution State Pilots Association, 3 miles east of Montauk Point Lighted Whistle Buoy MP;

(103) Long Island Sound State Pilots Association, Inc., at Montauk Point Lighted Whistle Buoy MP.

(104) **Montauk Harbor**, in the northern part of **Lake Montauk**, is entered through a dredged channel on the northern shore about 3 miles west of Montauk Point. The entrance is protected by jetties, each of which is marked by a light, and the west jetty has a fog signal. A lighted bell buoy, about 0.3 mile north of the entrance, marks the approach to the harbor. In March 2000, the controlling depths in the channel was 12 feet to the boat basin northwestward of Star Island, thence 11 feet (12 feet at midchannel) to the yacht basin east of Star Island. In March 1999, the boat basin had depths of 9½ feet with shoaling to 8 feet along the southwest edge. The channel is marked by private seasonal buoys.

(105) **Star Island**, just inside Montauk Harbor, is connected to the mainland by a causeway. A private light is shown from the eastern side of the island. Depths of 7 to 15 feet are reported in the yacht basin off the eastern side of the island; caution is advised in selecting anchorage because lesser depths may be found. A privately marked channel with a reported controlling depth of 7 feet in June 1999, leads from the yacht basin to the southern part of Lake Montauk where there are depths of 6 to 8 feet in the center.

(106) **COLREGS Demarcation Lines.**—The lines established for Montauk Harbor are described in **80.155**, chapter 2.

(107) The mean range of **tide** is 1.9 feet.

(108) Tidal **currents** at the entrance to Montauk Harbor have a velocity of 1.2 knots on the flood and about 0.5 knot on the ebb. They are reported to decrease rapidly after entering the harbor and are practically negligible near the yacht club landing on the east side of Star Island. (See Tidal Current Tables for predictions.) **Montauk Coast Guard Station** is at the northern end of Star Island.

(109) There are several small-craft facilities on both sides of the entrance to Montauk Harbor, and a yacht club and several marinas are on the east side of Star Island. Gasoline, diesel fuel, water, ice, marine supplies, and space for transients are available. Lifts to 80 tons can handle craft for complete engine and hull repairs. Groceries and other supplies may be obtained at the village of Montauk.

(110) **Fort Pond Bay** is a semicircular bight about 1 mile wide on the north side of Long Island, 5 miles westward of Montauk Point. The bay is free of dangers, but flats with 8 to 12 feet over them make out 0.2 mile from its eastern shore. The bay affords anchorage in 40 to 50 feet, soft bottom, but is exposed to northerly and northwesterly winds; the shoaling is abrupt on its east and south sides.

(111) **Montauk**, a summer resort at the southeast end of the bay, is the terminus of the Long Island Railroad. A depth of 10 feet was reported alongside the commercial pier on the east side of the bay. There are no public piers available.

(112) **Napeague Bay**, 8 miles westward of Montauk Point, is shallow in the western and southwestern part. **Promised Land Channel**, the buoyed passage southward of Gardiners and Cartwright Islands, has a least centerline depth of about 14 feet; however, the depth is continually changing due to the shifting shoals.

(113) The tidal currents have a velocity of about 1.5 knots through all the channels between the shoals. It is not advisable for vessels drawing more than 10 feet to attempt the passage without local knowledge, and then only when the buoys can be seen.

(114) **Napeague Harbor**, a small-craft refuge in the southwest part of Napeague Bay, can be entered through privately dredged channels northward and southward of **Hicks Island**. In June 1981, the reported controlling depths were 4 feet in the northerly and southerly entrances. Depths in the central part of the harbor range from 1½ to 7 feet; the chart is the best guide. The harbor is especially useful in northeasterly weather when the adjoining bays are unsafe. There are no landings in the harbor.

(115) **Promised Land** is a former fishing village on the southwest side of Napeague Bay. A depth of about 4 feet can be carried to the landing at the yacht club, 1.3 miles westward of Promised Land.

(116) **Gardiners Island**, 11 miles westward of Montauk Point, is partly wooded and has an elevation of 130 feet near its middle. **Cartwright Island** is narrow, low, and sandy, and extends 1 mile in a southerly direction off the south tip of Gardiners Island. Its size and shape are subject to considerable change by storms.

(117) **Crow Head** is the high bluff at the western end of Gardiners Island. Shoal water with depths of 9 to 16 feet extends 1.8 miles southwestward from **Cherry Hill Point**, the westerly end of Gardiners Island, and terminates at **Crow Shoal**. The shoal has depths of 3 to 11 feet and is marked by a buoy. An obstruction covered 12 feet is 200 yards eastward of the buoy.

(118) The bight between the southern part of Gardiners Island and Crow Shoal is **Cherry Harbor**. It has depths of 24 to 27 feet with mud bottom and affords shelter from northeasterly winds. **Bostwick Bay** is the bight on the northwest side of Gardiners Island. It affords excellent anchorage in easterly winds in depths of about 25 feet, but is exposed to all westerly winds.

(119) **Gardiners Point**, a low spit, is at the northerly end of a very shoal bar which extends 1.5 miles north-northwestward from Gardiners Island. This shoal is steep-to on its north and west sides and is marked by a lighted gong buoy. A rock with a depth of 2 feet over it is about 0.8 mile eastward of the north point of Gardiners Island and is marked by a buoy.

(120) The **Ruins**, a concrete structure on Gardiners Point, is Government property and formerly a naval aircraft bombing target; it is prohibited to the public. The Ruins and the area within 300 yards radius of it is dangerous due to the possible existence of undetonated explosives.

(121) A **restricted anchorage** for U.S. Navy submarines is about 3 miles eastward of Gardiners Island. (See **110.1 and 110.150**, chapter 2, for limits and regulations.)

(122) **Gardiners Bay** is at the western end of Block Island Sound from which it is separated by Gardiners Island. The bay is an excellent anchorage easily entered day or night, and is the approach to Shelter Island Sound and the Peconic Bays. The principal entrance is northward of Gardiners Point. The entrance from Long Island Sound is through Plum Gut. The entrance southward of Gardiners Island is used by fishing vessels.

(123) The principal guides for the entrance to Gardiners Bay from Block Island Sound are the lighted gong buoy north of Gardiners Point, Little Gull Light, and Orient Point Light. The white church spires at Orient and Sag Harbor are prominent. When past the lighted gong buoy north of Gardiners Point, vessels can select the anchorage in Gardiners Bay which affords the best lee in the prevailing winds.

(124) The principal dangers in approaching Gardiners Bay from the northward are the broken ground between Constellation Rock and Plum Island, and the shoal making out to Gardiners Point. In the bay, Crow Shoal should be avoided. In general, the shoaling is rather abrupt in approaching these dangers and gradual in approaching the shoals on the western side of the bay.

(125) **Plum Island**, about 2 miles westward of Great Gull Island, is 2.5 miles long, hilly, and bare of trees except near the southwest end, and has several large buildings, a prominent tank and flagpole, and is marked on its western point by Plum Gut Light. The island is a Government reservation and closed to the public.

(126) The bight in the southeast side of Plum Island is foul to **Plum Island Rock**, which is 0.5 mile from shore abreast of the middle of the island, has 1 foot over it and is marked by a buoy.

(127) **Plum Gut Harbor**, on the southwest side of Plum Island, has an entrance between jetties with private seasonal lights on dolphins off the outer ends. The lights are shown daily from sundown to 0130. A private fog signal at the west jetty light is sounded occasionally when Department of Agriculture vessels are navigating in the area. A depth of about 14 feet is in the entrance. Small yachts seeking shelter in an emergency lie alongside the wharves. The harbor is under the supervision of the Department of Agriculture and the Coast Guard, and may be used only with permission.

(128) **COLREGS Demarcation Lines**.—The lines established for Plum Gut Harbor are described in **80.155**, chapter 2.

(129) **Plum Gut**, the entrance to Gardiners Bay from Long Island Sound, is nearly 0.6 mile wide and has sufficient water for vessels of the deepest draft; in the passage are several rocks with depths of 17 to 19 feet over them. Tidal currents set through the passage with great velocity. Steamers, or sailing vessels with a strong favorable wind, should have no difficulty in passing through.

(130) Velocities of the current on flood and ebb are 3.5 and 4.3 knots, respectively. The flood sets northwestward and the ebb southeastward. Heavy tide rips occur. In November 1983, NOAA Ships RUDE and HECK reported that during the flood a countercurrent normally develops along the north shore of Plum Island. This countercurrent is most prevalent within 0.5 mile of the island. Caution is recommended when using this passage.

(131) **Oyster Pond Reef**, extending about 0.5 mile east-northeastward from **Orient Point**, is marked by a light and fog signal. Caution is recommended regarding the fog signal, as it may be difficult to hear at times, particularly with an easterly wind. Numerous boulders and little depth are between the light and Orient Point. **Midway Shoal**, about 0.5 mile east of the light, has 17 feet over it and is marked by a buoy.

(132) When using Plum Gut it is well to give Plum Island and Orient Point Light a berth of 0.2 mile. The best water in the passage will be found on a **295°** course, passing **Pine Point** and the buoy marking Midway Shoal at a distance of 350 yards and passing midway between Orient Point Light and Plum Gut Light on the western end of Plum Island.

(133) A channel, with a reported controlling depth of 7 feet in 1999, leads to a research basin operated by the U.S. Department of Agriculture on the south side of Orient Point, about 1 mile southwest of Orient Point Light. A ferry operates between here, Plum Island and New London. A small-craft facility is about 0.1 mile westward of the wharf. Berths, electricity, gasoline, diesel

fuel, water, ice, and a launching ramp are available. In June 1981, a reported depth of about 6 feet could be carried to the facility.

(134) **Acabonack Harbor**, at the southeast end of Gardiners Bay, is entered through a privately maintained and marked channel with a reported controlling depth of 2½ feet in the entrance in June 1981. There is deeper water inside.

(135) **Hog Creek Point**, on the southerly side of Gardiners Bay, is generally flat, with bluffs approximately 25 feet in height. **Lionhead Rock**, off the point and marked by a buoy, is awash at high water. Fishtraps are westward of the point.

(136) **Threemile Harbor**, on the south side of Gardiners Bay 1.7 miles southwestward of Hog Creek Point, is entered through a channel with two privately dredged sections. In September 1980, a portion of the wooden bulkhead on the west side of the entrance collapsed into the channel. In 1981, it was reported that by favoring the east side of the entrance channel a depth of 8 feet could be carried to a point opposite **Maidstone Park**, thence in 1996, a reported depth of 6 feet could be carried to the basin at the head of the harbor. The approach to the harbor is marked by a seasonal lighted bell buoy, and the channel is marked by lighted and unlighted buoys. The jetties at the harbor entrance are marked on the outer ends by private lights. A public commercial landing with reported depths of 8 feet is on the east side of the channel about 0.6 mile above the entrance. A 5 mph **speed limit** is enforced in the harbor.

(137) Anchorage is available in Threemile Harbor in depths of 9 to 14 feet with soft bottom and good holding ground; this is a good anchorage during strong winds. The range of **tide** in the entrance to the harbor is 2.4 feet. The **tidal current** has a velocity of about 3 knots through the entrance.

(138) Small-craft facilities on the east and south sides of Threemile Harbor can provide berths, electricity, gasoline, diesel fuel, water, ice, launching ramps, storage, lifts to 40 tons, and hull and engine repair. Provisions can be obtained at the town of **East Hampton**, 3.5 miles south of Threemile Harbor.

(139) In June 1989, the public pier maintained by the town of East Hampton at the head of the harbor had reported depths of 7 feet at its face and 4 feet on its west side.

(140) **COLREGS Demarcation Lines**.—The lines established for Threemile Harbor are described in **80.155**, chapter 2.

(141) **Chart 12358.—Shelter Island Sound** and Peconic Bays extend westward from Gardiners Bay about 22 miles to Riverhead, the head of navigation on Peconic River. They are much frequented by yachts and other small craft in the summer. Fishtraps and oyster stakes are on many of the shoals.

(142) A depth of about 26 feet can be carried through the channel north of Shelter Island and through Little Peconic Bay as far as Robins Island, and about 13 feet through the channel south of Shelter Island. Across the bar between Little and Great Peconic Bays about 13 feet can be carried. With local knowledge greater depths can be carried in the channels and across the bar. A depth of about 6 feet can be taken to South Jamesport and Riverhead.

(143) The mean range of **tide** is about 2.5 feet. The **tidal currents** have considerable velocity wherever the channel is narrowed. The velocity in the narrower places is about 1.8 knots.

(144) **Ice** obstructs navigation in the coves and shallow harbors during January and February. In severe winters, drift ice is reported to interfere with navigation for short periods of time. In the south arm of Shelter Island Sound, the ice is heavy enough at times to destroy structures exposed to it.

(145) Diesel fuel, gasoline, ice, water, marine supplies, and other provisions can best be obtained at Greenport and Sag Harbor. Several boatyards, shipyards, marine railways, and enclosed basins with excellent repair facilities are at Greenport.

(146) **Ram Head** is a prominent sandy bluff on the western shore of Gardiners Bay. A lower bluff is nearly 1.5 miles westward of Ram Head with numerous houses along the top. A shoal with 7 to 17 feet over it extends about 2.4 miles southeastward from Ram Head.

(147) A boulder with 1 foot over it is 230 yards from shore about 0.3 mile northeastward of the northern point of the entrance to Coecles Harbor. Other boulders with little depth are between this boulder and Ram Head.

(148) The entrance to **Coecles Harbor** is at the south end of Ram Head; the channel is marked by private seasonal buoys and a private seasonal light. In April 1996, the reported controlling depth in the privately maintained entrance channel was 8 feet. The **speed limit** is 5 mph. A marina and boatyard are in the harbor. A mobile hoist at the boatyard can haul out craft up to 35 tons; gasoline, water, ice, diesel fuel, marine supplies, sewage pumpout, berths, guest moorings, storage facilities, and complete engine and hull repairs are available. In June 1981, a reported depth of 5½ feet could be carried to the marina and boatyard.

(149) A **special anchorage** is in Coecles Harbor. (See **110.1 and 110.60(y)**, chapter 2, for limits and regulations.)

(150) **COLREGS Demarcation Lines**.—The lines established for Coecles Harbor are described in **80.155**, chapter 2.

(151) Extensive flats make off from Ram Head and the shore between it and **Hay Beach Point**, the northernmost point of Shelter Island, which is a low flat with a clump of scrub at its end and backed by wooded highland. **Long Beach Point** is a low spit eastward of Hay Beach Point. A bar with little depth extends southwesterly from Long Beach Point to the ruins of a former lighthouse of which only the 10-foot concrete foundation remains. A private light marks the ruins.

(152) Shoals with depths of 10 to 12 feet extend 0.5 mile eastward from Long Beach Point. The south and west sides of this shoal have depths of 12 to 15 feet, and rise abruptly from the channel. The limits of the shoal south of the point are marked by buoys. The bar has extended southward enough to be a real danger to small craft.

(153) **COLREGS Demarcation Lines**.—The lines established for the Long Island bays are described in **80.155**, chapter 2.

(154) **Orient Harbor**, about 4 miles northwestward of Ram Head, is an excellent anchorage; the depths range from over 20 feet in its southern part to 16 feet at its northern end. **Orient** is a village at the northeast end of Orient Harbor. At the end of the main wharf the depth is 8½ feet. The eastern part of Orient Harbor has depths of 7 to 9 feet. Fish traps are on the shoals.

(155) About 0.4 mile northeastward of **Cleaves Point**, at the southwest end of Orient Harbor, the shore has been cut through to a small pond which is used as a private basin for small craft. The entrance, between two jetties, has a depth of about 3 feet over the bar, with about 6 feet in the basin. Permission is required before anchoring in the basin. Rocks are 0.2 mile south of the entrance.

(156) **Hallock Bay** makes eastward from Orient Harbor on the north side of Long Beach Point. A channel, marked by uncharted private daybeacons, leads into the bay. The bay is shallow and dangers and shoaling have been reported. Local knowledge is advised prior to entering.

(157) **Gull Pond** is 0.3 mile westward of Cleaves Point at the southwest end of Orient Harbor. In July 1981, a reported depth of 4 feet could be carried through the entrance, with depths of 10 to 15 feet reported in the pond. A State launching ramp is available in the pond.

(158) **Greenport** is an important town and the terminus of a branch of the Long Island Railroad. The white church spires, near the northern end of town, and a tank and TV radio tower in the center of town are prominent.

(159) **Greenport Harbor** is formed on the northeast by a 5-foot-high breakwater, which extends 0.2 mile southeastward from **Yongs Point**, nearly to the 18-foot curve, and is marked at its outer end by a light. The depths at the wharves range from 5 to 20 feet. The railroad wharf on the south side of the waterfront can accommodate a vessel up to 100 feet.

(160) **Stirling Basin**, on the northeast side of Greenport, is a part of Greenport Harbor. In July 1981, the reported controlling depth was 8 feet in the entrance channel with 10 to 12 feet in the mooring areas. The entrance channel is marked by private seasonal buoys. Two smaller privately dredged channels with depths of about 9 feet reported are in the northeastern part of the basin. The **harbormaster** for Greenport Harbor controls mooring and berthing in the basin. The **speed limit** is 5 mph.

(161) Small-craft facilities at Greenport can provide berths, electricity, gasoline, diesel fuel, water, ice, storage, marine supplies, and hull and engine repairs. The largest marine railway, at a shipbuilding company at the southeast end of the waterfront, can handle craft up to 500 tons and 15 feet in draft. Mobile hoists to 50 tons are available. A well-equipped machine shop is also in the town.

(162) A ferry operates between Greenport and Shelter Island. During the summer, bus service is available from Greenport to Orient Point where there is ferry service to New London.

(163) **Dering Harbor**, southward of Greenport and at the northwest end of Shelter Island, is a favorite anchorage for yachts and motorboats. The entrance to the harbor, marked by private buoys, is partially constricted by a disposal area in about midentrance and shoal area with a reported depth of 4 feet in June 1981 that extends from the southwestern entrance point to near the disposal area; caution is advised. In April 1989, it was reported that about 10 feet could be carried into the harbor with local knowledge. Depths of 10 to 14 feet are available in the central part of the harbor, with much lesser depths around the edges. Moorings and float landings for small craft are in the bight at the southwest end of the harbor. Vessels too large to enter can anchor outside the harbor in depths of 14 to 30 feet. The **speed limit** is 5 mph. Small-craft facilities, on the west side of the harbor, can provide berths, electricity, gasoline, diesel fuel, water, ice, marine supplies, sewage pumpout, and hull and outboard engine repairs. A launching ramp is also available. **Shelter Island Heights** is on the southwestern side of Dering Harbor.

(164) **Fanning Point** is on the north shore at the southwest end of Greenport. A shoal extends 300 yards off the point and is marked by a buoy. Four dolphins, part of a former oil facility, are northward of the point. Currents of 2 knots, running fair with the channel, have been reported in the vicinity of Fanning Point.

(165) **Conkling Point**, on the north shore 1 mile southwestward of Fanning Point, is low and sandy at the end and has deep water as close as 150 yards. A marina on the southwest side of the point had a reported depth of 5½ feet in the approach in July 1981. Berths, electricity, gasoline, marine supplies, storage, a launch-

ing ramp, and a 30-ton mobile hoist are available. Hull and engine repairs can be made.

(166) **Mill Creek** is the entrance to **Hashamomuck Pond**, about 1.1 miles westward of Conkling Point. In July 1981, the privately dredged entrance channel into the creek had a controlling depth of 4 feet, thence 3½ feet was reported in the channel along the northwest shore of Mill Creek. The entrance channel is marked by private seasonal buoys. About 400 yards eastward of the creek is a small bight entered through a channel with a depth of about 4 feet and marked by private seasonal lights and buoys. In May 1992, severe shoaling was reported across the entrance.

(167) **Jennings Point**, the western end of Shelter Island, is high and wooded. Rocks are off the point close-to, and it should be given a berth of over 150 yards. A lighted buoy is off the point. A gazebo on the point is prominent.

(168) The town of **Southold** is at the head of **Southold Bay**, which is the bight at the western end of Shelter Island Sound westward of Jennings Point. For about a mile northeastward of the entrance jetty, shoals with 12 feet or less extend nearly 0.4 mile from shore and are generally steep-to. The southwest part of the bay is shoal for about 0.3 mile from shore. Anchorage can be selected east-southeast of the jetty at a distance of from 0.2 to 0.4 mile, in 12 to 18 feet.

(169) A small jettied basin is about 0.5 mile northeast of Southold entrance. The overhead power cable crossing the entrance has a clearance of 31 feet. There are no public landings in the basin.

(170) In April 1989, the reported controlling depth was about 3 feet in the privately maintained channels in **Town Creek**, **Jockey Creek**, and **Goose Creek**. The common entrance to Town Creek and Jockey Creek is marked by private seasonal buoys. The highway bridge at the mouth of Goose Creek has a clearance of 9 feet and the bridge that crosses Jockey Creek has a 45-foot fixed span with a vertical clearance of 6 ½ feet.

(171) On the shore south of Southold entrance jetty is a prominent white tower.

(172) There are several small-craft facilities on the creeks and along the west shore of Southold Bay from Paradise Point to Conkling Point. Berths, electricity, gasoline, water, ice, marine supplies, launching ramps, storage, lifts, and cranes are available. Provisions can be obtained at Southold.

(173) **Paradise Point**, on the west side of Shelter Island Sound, is low and wooded, and from the point a sloping sandspit extends about 0.3 mile eastward and is marked by a lighted buoy. Southward of Paradise Point, shoals with depths of 10 to 15 feet extend from the west shore to midsound; the southeast point of the shoals is marked by a buoy.

(174) The channel south of Shelter Island has numerous shoals, but is easily followed by vessels of 13 feet or less draft when the buoys can be seen. The channel is used by vessels going to Sag Harbor. Vessels operating between Greenport and Sag Harbor prefer the inside route around the western end of Shelter Island. The **tidal current** in the channel between Shelter Island and North Haven Peninsula has a velocity of about 2.4 knots. The approach from Gardiners Bay is across a shoal or bar which extends in a southeasterly direction from Ram Head to the south shore, the depths on which vary from 7 to 11 feet about 1.6 miles from Ram Head, and thence 13 to 17 feet to the buoys which mark the entrance.

(175) **Dangerous Rock**, awash at low water in surrounding depths of about 12 feet, is 0.2 mile south of the channel.

(176) A shoal extends 0.3 to 0.4 mile north of the shore of **Cedar Point** which is marked by a light. The shoal has boulders, and its edge is marked by buoys.

(177) Shoals with boulders and little water over them in places extend nearly 0.5 mile southeastward from **Nicoll Point**. Buoys mark the limit of the channel in this area.

(178) **Northwest Harbor**, between Cedar Island Light and **Barcelona Point**, is strewn with boulders covered by 4 to 6 feet.

(179) **Sand Spit**, an extensive shoal partly bare at half-tide, is between **Mashomack Point**, the southeastern extremity of Shelter Island, and Sag Harbor. The spit is marked by buoys and a light.

(180) A group of rocks locally known as **Gull Island**, showing bare at half-tide, is nearly 0.4 mile northeastward of the breakwater at Sag Harbor.

(181) **Sag Harbor**, about 2.5 miles southwestward of the light on Cedar Point, is protected on the northeast by a breakwater marked at the outer end by a light. A spherical tank, a radio tower, and several flagpoles are prominent landmarks.

(182) In entering Sag Harbor, do not round the breakwater too closely, as a depth of about 6 feet is found near its end. The deepest water is near the buoy. Anchor eastward or northeastward of the end of the former ferry wharf, locally known as Long Wharf. A 5 mph **speed limit** is enforced.

(183) In July 1974, the dredged channel into Sag Harbor had a controlling depth of 8 feet (10 feet at midchannel) through the entrance to the turning basin, 9 feet in the turning basin, 5 feet in the southerly anchorage area, and 7 feet in the main anchorage area. In 1991, the channel was no longer being maintained. The channel to **Sag Harbor Cove** is about 8 feet deep; this channel and the cove are marked by private seasonal lights and buoys. A 37-foot-wide fixed bridge at the entrance has a clearance of 20 feet. Berths, electricity, gasoline, diesel fuel, storage, marine supplies, water, ice, launching ramps, and complete engine, hull, rigging, and sail repairs are available at Sag Harbor; a 30-ton mobile hoist, near the inner end of the breakwater, can haul out craft up to about 60 feet.

(184) **Smith Cove**, a small bight on the south side of Shelter Island, is a good anchorage for small craft in northerly weather. Depths range from 11 to 30 feet. A marina on the west side of the cove can provide moorings, limited berths, gasoline, electricity, water, and some marine supplies. In June 1981, a depth of 6 feet was reported alongside the pier at the marina. A ferry operates between **South Ferry** on the southwest side of the cove to **North Haven Peninsula**.

(185) **West Neck Harbor** and **West Neck Bay** are shallow bodies of water on the southwest side of Shelter Island. In June 1989, it was reported that a depth of 2 feet could be carried over the bar and into the harbor from Shelter Island Sound. The entrance is close eastward of the seaward end of a peninsula, marked by a private lighted buoy, that separates the harbor from the sound, and the channel follows along the north side of this peninsula. The channel is marked by private buoys. The harbor has numerous private landings. A boatyard with a marine railway can handle craft up to 40 feet for hull and engine repairs. Berths, gasoline, water, ice, a launching ramp, and some marine supplies are available.

(186) A special anchorage is in West Neck Harbor. (See **110.1 and 110.60 (y-1)**, chapter 2, for limits and regulations.)

(187) **Noyack (Noyac) Bay** is between North Haven Peninsula and Jessup Neck and southward of the western end of Shelter Is-

land. No dangers will be encountered if the shores are given a berth of 0.4 mile.

(188) **Mill Creek**, in the southern part of Noyack Bay, is entered through a privately dredged channel that leads to a basin. The channel is marked by private seasonal lights and buoys. In 1991, the reported controlling depth was 8 feet in the channel; thence in 1981, 6 feet in the basin. A clubhouse on the west side of the entrance is prominent. Small-craft facilities in the creek can provide berths, electricity, gasoline, water, ice, storage, a launching ramp, marine supplies, and hull and engine repairs; a 25-ton mobile hoist is available.

(189) **Jessup Neck** is a long narrow strip, partly high and wooded, separating Noyack Bay from Little Peconic Bay. The north end of the neck is a sandspit from which a shoal with 4 to 12 feet over it extends nearly 0.4 mile north-northwestward. A lighted buoy marks the outer end of the shoal area.

(190) A shoal with depths of 5 to 7 feet extends 1.5 miles southwestward from **Great Hog Neck**, on the northwest side at the entrance to Little Peconic Bay; this shoal is marked by a buoy.

(191) Heavy tide rips occur southeast of Great Hog Neck during the flood with a southwesterly wind. At such times, small craft can avoid the worst of them by favoring the shore on the northwest side of the passage.

(192) **Richmond Creek** and **Corey Creek** are at the head of **Hog Neck Bay**. A depth of about 7 feet can be taken in the privately dredged channel leading to a basin in Richmond Creek; the channel is marked by private seasonal buoys. In August 1999, the dredged channel leading into and connecting with small boat channels in Corey Creek had a controlling depth of 4 feet. In 1964, controlling depths in the small-boat channels inside Corey Creek were 5½ to 6 feet. The entrance channel is marked by private buoys.

(193) **Little Peconic Bay** is about 5 miles long. The southerly shore of the bay is clear if given a berth of 0.4 mile, but shoals extend 0.6 mile from the south end of the bay.

(194) An aquaculture site, marked by private seasonal buoys, is at the south end of Little Peconic Bay about 1 mile north-northwest of the entrance to North Sea Harbor.

(195) A prominent sandy bluff, known locally as **Holmes Hill**, is just west of the entrance to **North Sea Harbor**. In June 1981, the reported controlling depth through the dredged channel into the harbor was 4 feet. The channel is marked by private seasonal buoys and by a private seasonal light at the entrance. This is an excellent harbor of refuge for small craft with drafts not exceeding 3½ feet. The bottom is soft with good holding ground.

(196) A marina in the harbor has gasoline, ice, water, some marine supplies, and a lift that can handle craft to 10 tons; hull and engine repairs can be made.

(197) **Wooley Pond**, 1 mile northeastward of North Sea Harbor, is entered through a dredged channel which, in June 1981, had a reported controlling depth of 6 feet. The channel is marked by private seasonal buoys and by a private seasonal light on the north side of the entrance.

(198) A marina in the pond can provide berths, electricity, gasoline, water, ice, storage, marine supplies, and hull and engine repairs; a 45-foot marine railway and a 12-ton forklift are available. In June 1981, depths of 5 to 6 feet were reported available at the marina.

(199) **Nassau Point**, the long neck on the northwest side of Little Peconic Bay, has high bluffs on the eastern side. A shoal with

little depth over it extends 0.5 mile southward from Nassau Point and is marked by a lighted buoy.

(200) **Cutchogue Harbor**, between Nassau Point and New Suffolk, is used by local boats drawing 6 to 10 feet. On the east shore of the harbor, northwestward of Nassau Point, three channels leading into the ponds have been dredged by private interests. At the middle of the three channels, 0.9 mile northwest of the extremity of Nassau Point, are several private wharves. The channel leads between two jetties, and a depth of about 3 feet can be carried into the pond and 1 foot to some of the wharves.

(201) **Haywater Cove, Broadwater Cove, Mud Creek, and East Creek**, used by local interests and sharing a common entrance, are at the head of Cutchogue Harbor. The entrance channel and the channels through these waterways have been privately dredged. In August 1999, a reported depth of 6 feet was available in the entrance channel; thence in 1966, 6 feet in East Creek and 7 feet in Haywater Cove and Broadwater Cove; thence in 1976, 6 feet in the Mud Creek. Shoaling is reported to occur in these areas; caution is advised.

(202) A depth of 8 feet can be taken within 100 feet of the wharves at **New Suffolk** by passing eastward and about 200 yards northward of the buoy westward of Nassau Point and steering westward for the wharves. A small basin, with a depth of about 8 feet reported in 1981, is northward of the wharf. In July 1981, shoaling to 2 feet was reported in the southern part of Cutchogue Harbor, about 0.4 mile east of New Suffolk.

(203) A larger basin at the north end of New Suffolk, locally known as **School House Creek**, extends to the highway. The entrance channel is protected by a short rock jetty, covered at high water, on the south. The depth to the boatyard at the head of the basin was reported to be about 4 feet in June 1981. Berths, gasoline, storage, marine supplies, hull and engine repairs, and a 30-ton mobile hoist are available at the boatyard.

(204) **Wickham Creek**, locally known as Boatmens Harbor, 0.7 mile north of New Suffolk, is entered through a privately dredged entrance channel with a reported controlling depth of 6 feet in July 1981. The channel is marked by private seasonal buoys and bush stakes. Gasoline, water, ice, storage, a launching ramp, and some marine supplies are available in the basin. A flatbed trailer can haul out craft to 32 feet.

(205) In southeast gales, local craft of less than 6-foot draft seek shelter in the small cove, locally known as **Horseshoe Cove**, in the northeast part of Cutchogue Harbor.

(206) The through channel in **North Race**, northward of **Robins Island**, is marked and used only by light-draft boats. **South Race**, the channel southward of Robins Island, has a controlling depth of about 13 feet and is marked by buoys.

(207) An aquaculture site, marked by private buoys, is 0.6 mile southwest of the south end of Robins Island.

(208) Tide rips occur between the mainland and the south end of Robins Island when the tidal current sets against the wind.

(209) **Great Peconic Bay**, about 5 miles in diameter, is used mostly by local motorboats from Shinnecock Canal and by yachts. The bay is generally clear, but extensive shoals make off from the shores, except on its south side. Shinnecock Canal, the entrance from the south, is described in chapter 10.

(210) **Rodgers Rock**, about 1.3 miles west-southwestward of **Cow Neck** and about 1.2 miles south-southwest of Robins Island, has a depth of 6 feet over it and is marked on the northeast side by a buoy. **Robins Island Rock**, 0.8 mile westward of the

south end of Robins Island, is awash at low water. It is marked by a buoy. Caution is recommended in this vicinity.

(211) **Sebonac Creek**, on the southeast side of Great Peconic Bay, is used extensively by yachts, and serves as a yacht harbor for the town of Southampton. A privately dredged channel, marked by private seasonal lights and buoys, leads into the creek and had a reported controlling depth of 8 feet in June 1981. The landings are at **West Neck**, a small settlement northeastward of **Ram Island** in **Bullhead Bay**. An obstruction buoy is locally maintained during the summer to mark a rock, covered 1½ feet, about 100 feet westward of the town landing. In June 1981, a reported depth of 5 feet could be carried to the town landing. A 5 mph speed limit is enforced.

(212) **Cold Spring Pond**, about 1.6 miles southwestward of Sebonac Creek and 1.1 miles eastward of Shinnecock Canal entrance, is entered through a privately dredged channel which had a reported depth of 2 feet in June 1981. In May 1992, severe shoaling was reported in the entrance. The entrance channel to the pond is marked by a private seasonal light and buoy. An overhead power cable at the entrance to the pond has a clearance of 34 feet.

(213) **James Creek**, on the north shore of Great Peconic Bay opposite the entrance to Shinnecock Canal, is entered through a privately dredged channel that had a reported controlling depth of 6 feet in 1981. The entrance is marked by private seasonal buoys. Small-craft facilities on the creek can provide berths, gasoline, storage, launching ramps, and hull and engine repairs. A flatbed trailer can haul out craft to 30 feet.

(214) **South Jamesport** is a village on **Miamogue Point**, 3.4 miles southwestward of James Creek. Local knowledge is necessary to avoid the shoals in this area, and strangers should take soundings frequently to keep in the best water. A small-craft facility at South Jamesport can provide berths, electricity, gasoline, water, ice, launching ramps, storage, marine supplies, and hull and engine repairs; a 25-ton mobile hoist is available. In June 1981, a reported depth of about 8 feet could be taken to the facility. The town has railroad passenger and bus service.

(215) **Peconic River** empties into the western end of Flanders Bay, about 1.5 miles westward of South Jamesport. The river is entered through a dredged channel marked by private seasonal lights that leads from Flanders Bay to the head of navigation at **Riverhead**, about 2.4 miles above the channel entrance. The dredged channel is approached from deep water in Great Peconic Bay through a marked channel. In June 1991, the controlling depth was 5 feet in the dredged channel. A fixed highway bridge with a clearance of 25 feet crosses the river about 0.9 mile above the mouth.

(216) **Flanders Bay** is the scene of considerable small boat activity. A yacht club is at Riverhead; limited berths, electricity, and water are available.

(217) **Meetinghouse Creek, Terrys Creek, and Reeves Creek**, which empty into the northwestern part of Flanders Bay, are entered through privately dredged channels. In June 1981, the channels had reported controlling depths of 5 feet. The entrance channel leading to, and connecting with, Terrys Creek and Meetinghouse Creek is marked by private seasonal buoys and a private seasonal light. A marina is on Meetinghouse Creek. Berths, electricity, gasoline, water, ice, a 5-ton forklift, 30-ton mobile hoist, launching ramp, storage facilities, and hull and engine repairs are available. In June 1981, a reported depth of 7 feet was available at the marina.

(218) **Reeves Bay**, on the southwest side of Flanders Bay, is entered through a privately dredged channel that leads to the town of **Flanders** on the south side of the bay. In August 1999, the channel had a reported controlling depth of 2 feet. Other dredged channels lead from the entrance channel into several arms of the bay. A boatyard at Flanders has gasoline, storage facilities, marine supplies, and a 10-ton marine railway; hull and engine repairs can be made.

(219) **Chart 13214.—Fishers Island Sound** extends between the mainland of Connecticut and Fishers Island, and forms one of the entrances into Long Island Sound that is used to some extent by light tows and other vessels up to 14-foot draft. The sound has numerous shoals and lobster trap buoys, and the entire area is exceedingly treacherous, characterized by boulder patches that rise abruptly from deep water. Vessels should follow the deeper channels between the shoals and proceed with caution if obliged to cross shoal areas. In general, all shoal spots or abrupt changes of depth are indications of boulders and should be avoided as anchorages.

(220) **Tides and currents.**—In Watch Hill Passage the tidal currents are strong and necessitate caution in navigating. Buoys may be towed under. The flood current sets nearly in the direction of the channel, but has a tendency to northward and the ebb a tendency to southward. The northerly and southerly set is more marked between Napatree Point and Latimer Reef Light.

(221) In Sugar Reef and Catumb Passages the tidal currents set obliquely across the axis of the channel. The flood sets northwestward and the ebb southeastward. The tidal currents in Sugar Reef Passage are about the same velocity as in Watch Hill Passage, but are stronger in Catumb Passage.

(222) In Lords Passage the tidal currents set diagonally across the channel and have a velocity of nearly 2 knots, the ebb being greater than the flood.

(223) In the main channel of Fishers Island Sound, the flood sets westward and the ebb eastward. In the main channel between Napatree Point and Wicopeset Island, the velocity of flood is 1.7 knots and ebb 2.2 knots. The flood sets 284° and the ebb 113°.

(224) In the channel south of Ram Island Reef, the velocities of flood and ebb are 1.3 and 1.6 knots, respectively. The flood sets 255° and the ebb 088°. The direction and velocity of the current are affected by strong winds that may change the duration of flood or ebb.

(225) The strong tidal currents prevent the formation of heavy local **ice**, except in shoal tributaries. The only ice to give trouble is that set in from Long Island Sound by wind and current. The ice formations in Little Narragansett Bay are sufficiently heavy to be destructive to structures exposed to them.

(226) On the south side of Fishers Island Sound, off the north side of **East Point** on Fishers Island, are **Seal Rocks**, partly bare at low water and marked by a buoy. A rocky patch covered 11 feet and marked by a buoy is about 500 yards northeastward of Seal Rocks. **Youngs Rock**, about 0.4 mile westward of Seal Rocks, has about 1 foot over it and is marked by a buoy. A rocky patch extends about 400 yards to the east-northeastward.

(227) **East Harbor** and **Chocomount Cove**, in the north shore of Fishers Island, are sometimes used as anchorages by small craft. There is considerable foul ground in East Harbor and in the approach to Chocomount Cove. The harbor and cove are exposed to northerly winds. A former Coast Guard Station with a boat-house and dock is prominent near the south side of East Harbor.

Several small private piers with about 6 feet at their ends are in East Harbor.

(228) The north shore of Fishers Island from East Harbor around into West Harbor has several private landings.

(229) **East Clump** is a cluster of rocks partly bare at high water and marked by a buoy about 0.8 mile north of Fishers Island. From East Clump for some 2.8 miles westward to North Dumppling, there are rocky islets and dangers which must be avoided. These are 0.5 to 0.8 mile off the Fishers Island shore, and most are buoyed. **North Dumppling**, an islet marked by a light and fog signal, is surrounded by rocks awash and foul ground. **Seaflower Reef**, marked by a light, is near the middle of the western entrance of Fishers Island Sound and 0.8 mile northwestward of North Dumppling Light.

(230) **West Harbor**, on the north side of Fishers Island south-eastward of North Dumppling Light, affords shelter from southerly winds. In April 1986, the dredged channel leading into the harbor along the west shore had a controlling depth of 12 feet. Foul ground extends across the entrance of West Harbor to near the eastern edge of the dredged channel; the northern limits of the foul ground are buoyed.

(231) A yacht club wharf and another small-craft facility are on the southwest side of the harbor. Gasoline, diesel fuel, water, ice, and hull and engine repairs are available. A marine railway can handle craft up to 40 feet. The head of the harbor is used by boats drawing less than 5 feet which enter by the narrow unmarked channel southward of **Goose Island**.

(232) **Hay Harbor**, at the west end of Fishers Island, is used by small craft.

(233) **Silver Eel Cove (Silver Eel Pond)** is on the west side of Fishers Island, 0.6 mile northeastward of Race Point. The entrance, about 75 feet wide and jettied, is marked by a private light and has a depth of about 11 feet, with similar depths inside. Submerged fender pilings are reported on both sides of the entrance. Dolphins are on the northeast side of the cove, and the channel is clear between them and the wharves on the southwest side. Vessels must go to the wharves as there is no room for anchorage. There is very little dockage available. The entrance is difficult with northwesterly or westerly winds. A lighted bell buoy is about 450 yards off the entrance. A ferry which operates between Fishers Island and New London lands here. During the summer, a Coast Guard unit is stationed inside the entrance to the cove.

(234) On the north side of Fishers Island Sound are: Little Narragansett Bay, and Pawcatuck River leading to the towns of Westerly and Pawcatuck; Stonington Harbor and the town of Stonington; and Mystic Harbor leading to the towns of Noank and Mystic.

(235) **Napatree Beach**, 1.3 miles long between Watch Hill Point and **Napatree Point**, is bare. **Sandy Point**, about 1.4 miles north-northwestward of Napatree Point, is at the northwestern end of a long and narrow sand island in Little Narragansett Bay. An extensive sandspit makes off from the northeasterly and southwesterly sides of the island; give these areas a good berth. The island is subject to continual change; caution is advised.

(236) **Napatree Point Ledge**, a boulder reef with little depth, extends nearly 0.4 mile southward of the point. It is marked by a lighted bell buoy. A sunken wreck is about 0.3 mile eastward of the ledge in about 41°18'N., 71°53'W.

(237) The west side of Napatree Point should not be approached closer than 175 yards to avoid a stone jetty which is covered at high water. Between Napatree Point and the Stonington outer

breakwater is an extensive flat on which the depths are 3 to 10 feet, rocky bottom. **Middle Ground**, the western part of the flat, is marked by the outer breakwater, which has a light at its western end. A fog signal is at the light.

(238) A depth of 17 feet can be taken to an anchorage inside this breakwater, giving the light on the breakwater a berth of more than 250 yards. In anchoring, give the inside of the breakwater a berth of over 300 yards to avoid shoals and fishweirs. This anchorage provides good shelter except in southwesterly and westerly winds, although it is seldom used.

(239) **Little Narragansett Bay**, at the eastern end of Fishers Island Sound, is entered at its extreme western end southward of Stonington Point. The channel, with dredged sections, extends generally southeasterly across the bay into Pawcatuck River to Westerly. In 1994, the controlling depth was 8 feet from the entrance to a point just southwest of Narragansett Bay Entrance Lighted Buoy 5 where the channel has been encroached upon by the shoaling off Sand Point. Deep water is available, with local knowledge, north of the channel opposite the shoal. The channel continues eastward of Narragansett Bay Entrance Lighted Buoy 5 to Narragansett Bay Entrance Buoy 9 with a controlling depth of 5 feet thence in 1989, 4½ feet to the entrance of Pawcatuck River. In March-April 1983, the controlling depth was 8 feet (10 feet at midchannel) to Certain Draw Point (41°20'33"N., 71°49'52"W.), thence 4 feet (7 feet at midchannel) for about 1.7 miles to a point in about 41°22.1'N., 71°50.1'W., thence 3½ feet at midchannel to Westerly. The channel is well marked.

(240) Caution should be exercised in entering Little Narragansett Bay. Shoal water extends for about 200 yards off **Stonington Point**, and the shoal area north of **Sandy Point** is subject to continual change. Strangers are advised to obtain local information before entering because of rocks and shoal water near the edges of the channel.

(241) In the dredged channel northward of Sandy Point, the currents have a velocity of 1.3 knots. The flood sets eastward and the ebb westward. (See the Tidal Current Tables for predictions and Tidal Current Charts, Block Island Sound and Eastern Long Island Sound, for hourly velocities and directions.)

(242) **Watch Hill Cove**, in the southeastern part of Little Narragansett Bay, is used by small craft. In August 1996, the buoyed dredged channel leading to the cove had a controlling depth of 6 feet (9 feet at midchannel) Depths of 6 to 10 feet are inside the cove and at the wharves. A **special anchorage** is in the

cove. (See **110.1** and **110.47**, chapter 2, for limits and regulations.)

(243) A yacht club and town dock are in Watch Hill Cove; berths, guest moorings, electricity, diesel fuel, and water are available. In July 1981, a depth of 10 feet was reported at the face of the town dock.

(244) **Pawcatuck River**, entered just south of **Pawcatuck Point**, extends about 4 miles to Westerly.

(245) About 1 mile above the entrance to Pawcatuck River the **tidal current** has a velocity of 0.6 knot on flood, and 0.5 knot on the ebb. The river is generally closed by **ice** from January to March.

(246) **Colonel Willie Cove**, 0.5 mile above Pawcatuck Point, has a boatyard with a marine railway that can handle craft up to 45 feet for hull and engine repairs. Berths, electricity, gasoline, water, ice, launching ramp, storage facilities, marine supplies, and a 20-ton crane are also available. In July 1981, a reported depth of 4 feet could be carried in the cove to the boatyard.

(247) A **special anchorage** is in **Thompson Cove**, 2 miles above Pawcatuck Point. (See **110.1** and **110.48**, chapter 2, for limits and regulations.) A yacht club pier is in the cove. Private seasonal buoys mark the approach to the pier.

(248) **Westerly**, 4 miles above Pawcatuck Point, is an important manufacturing town.

(249) There are numerous small-craft facilities along both sides of the Pawcatuck River and at the head at Westerly and Pawcatuck, just across the river. The largest marine railway in the area is at Avondale and it can handle craft to 55 feet. Berths, electricity, gasoline, diesel fuel, water, ice, storage facilities, launching ramps, lifts, and marine supplies are available. Depths of 7 to 9 feet are reported at the town dock at Pawcatuck.

(250) **Wequetequock Cove** is a shallow cove at the northern end of Little Narragansett Bay. A narrow unmarked channel leads eastward of **Elihu Island** into the cove. A depth of about 4 feet can be taken as far as **Goat Island**, about a mile above Sandy Point. A fixed railroad bridge with a clearance of 6 feet crosses the cove about 0.2 mile above Goat Island. A small-craft facility is on the west side of the cove near the head. Berths, gasoline, storage facilities, launching ramp, 4-ton forklift, marine supplies, and hull and engine repairs are available. In July 1981, a reported depth of 2 feet could be carried to the facility.

(251) **Stonington Harbor**, 3 miles northwestward of Watch Hill Point, is protected by breakwaters on each side. Each of the breakwaters is marked at its seaward end by a light. The controlling depth to the inner harbor is about 11 feet. Anchorage can be selected inside the west breakwater in depths of 15 to 18 feet, taking care to keep the south end of Wamphassuc Point bearing northward of 270°. Vessels drawing up to 8 feet can find anchorage in the inner harbor. A rock that bares at low water is about 50 yards southward of the fishing wharf and is marked by a private buoy. **Special anchorages** are in Stonington Harbor. (See **110.1** and **110.50**, chapter 2, for limits and regulations.)

(252) Stonington Harbor is approached from southeastward and westward. Vessels with local knowledge sometimes cross Noyes Shoal from southwestward. The southeastern approach is best, with fewer dangers, and the navigational aids serve as excellent guides to avoid them. In daytime with clear weather, no difficulty should be experienced in entering any of the approaches.

(253) From southeastward, the course from south of Napatree Point Ledge should be west-northwestward until off the buoy at the southwest end of Middle Ground, from which a northerly



course can be shaped past the breakwater lights and into the harbor.

(254) From southwestward, a northeasterly course can be shaped from the lighted bell buoy south of Ram Island Reef to south of White Rock, and thence eastward past the north side of Noyes Rock to the harbor.

(255) The inner breakwater, about 400 yards northward of Stonington Point on the east side of the entrance, extends westward about 250 yards and is marked by a light.

(256) **Stonington** is on the east side of the harbor. Traffic is mostly fishing and recreational craft. The wharves have depths of 7 to 12 feet alongside. Following southerly weather, a surge is felt by vessels tied to the southern side of the seaward pier.

(257) A boatyard is in the northeast part of the harbor. Berths, electricity, gasoline, diesel fuel, water, ice, storage, 40-ton lift, marine supplies, and hull, engine, and electronic repairs are available. In July 1981, a reported depth of 7 feet could be carried to the yard. A **harbormaster** is at Stonington.

(258) A railroad causeway, with two fixed spans each having a clearance of 4 feet, crosses Stonington Harbor 0.4 mile above Stonington. Overhead power cables at the openings have clearances of 41 feet.

(259) **Noyes Rock**, 0.4 mile southward of **Wamphassuc Point**, has a least depth of 7 feet. **Noyes Shoal**, with 10 to 18 feet over it, is nearly 1.5 miles long in a west-northwesterly direction; it is marked by a bell buoy near its eastern end.

(260) **Latimer Reef**, about 0.6 mile south of Noyes Shoal, is a very broken and rocky area 0.4 mile long. It is marked by a light at its west end and a buoy at its east end. The eastern end of the reef has a least found depth of 6 feet.

(261) **Latimer Reef Light** (41°18.3'N., 71°56.0'W.), 55 feet above the water, is shown from a white conical tower, brown mid-way of its height, on a brown cylindrical foundation. A fog signal is at the light.

(262) A detached 11-foot spot, marked by a buoy, is about 0.4 mile northeast of Latimer Reef Light.

(263) **Eel Grass Ground**, about 0.8 mile northwestward of Latimer Reef Light, is a shoal with a least depth of 6 feet, marked by buoys. **White Rock**, about 0.8 mile northeastward of Eel Grass Ground, is bare and prominent. **Red Reef**, covered 2 feet, is 0.2 mile north of White Rock and marked by a buoy. **Ellis Reef**, 0.4 mile northwestward of Eel Grass Ground, is marked on its east side by a daybeacon.

(264) **Mason Island**, 2.5 miles west of Stonington Harbor, is joined to the mainland by a fixed bridge with an 18-foot span and a clearance of 3 feet; the sound end of the island is strewn with boulders. A **special anchorage** is on the east side of Mason Island. (See **110.1 and 110.50a**, chapter 2, for limits and regulations.) An anchorage for small craft is on the west side of the south end of Mason Island where depths range from 8 to 11 feet; caution and local knowledge are required to use this anchorage because of the boulders in the area. A dangerous rock is off the east side of **Mason Point**, the southern extremity of Mason Island, in 41°19'21.6"N., 71°58'05.0"W.

(265) **Enders Island**, 0.3 mile eastward of the southern end of Mason Island, is connected to it by a fixed bridge with a 15-foot span and a clearance of 6 feet.

(266) **Ram Island Reef**, 1.8 miles westward of Latimer Reef Light, has two detached parts: the southerly section is covered 8 feet and marked by a lighted bell buoy, and the northerly section,

covered by 6 feet, is marked by a daybeacon. Passage between the reef and island is unsafe because of shoals.

(267) **Ram Island**, about 0.4 mile southwest of Mason Island, is wooded and grass-fringed. A shoal, on which are two rocky islets, extends about 0.2 mile northeastward from Ram Island. **Ram Island Shoal**, extending nearly 0.5 mile westward from Ram Island, has little water over it and many rocks bare at low water. **Whaleback Rock** and the islet 300 yards northwestward of it are bare.

(268) The narrow but deep channel along the north side of Ram Island Shoal is the easterly entrance to Mystic Harbor. Between the shoal and Groton Long Point is an area of foul ground and several dangerous rocks, including **Whale Rock**, which bares at low water, at the northwesterly end of Ram Island Shoal. This rock is marked by a seasonal lighted buoy. Leading across the shoal is the buoyed channel, good for about 11 feet, which is used by vessels entering Mystic Harbor from westward.

(269) A rock covered 6 feet is about 0.5 mile SW of Whale Rock; about 0.65 mile SW of that rock is **Intrepid Rock**, with 13 feet over it and marked by a buoy, which should be avoided. **Mouse Island**, marked by several dwellings, is 150 yards southwestward of Morgan Point.

(270) In November 1983, a rock, covered about 2 feet, was reported 0.2 mile west of Mouse Island in about 41°18'52"N., 71°59'50"W.

(271) **Morgan Point**, on the west side at the entrance of Mystic Harbor, is marked by an abandoned light tower. A privately maintained and marked channel leading to the piers in **West Cove** at Noank westward of the point had a least depth of 4 feet reported in July 1981.

(272) **Groton Long Point**, on which is a summer settlement, is about 0.9 mile southwestward of Morgan Point. A reef extends nearly 300 yards southwestward from the point and is marked by a buoy. About 0.3 mile to the west a rock awash at low water is 175 yards off the southwest end of Groton Long Point. It is marked by a buoy.

(273) **Mystic Harbor**, about 6 miles westward of Watch Hill Point, is the approach to the towns of Noank and Mystic. A channel with two dredged sections leads from Fishers Island Sound through Mystic Harbor to the Mystic Seaport Museum Wharf, 0.6 mile northward of the highway bridge at Mystic on the Mystic River. In August-October 1987, the midchannel controlling depths were 10 feet to the highway bridge, thence 8½ feet to the head of the Federal project. The channel is marked by buoys and a light. In November 1984, shoaling and timber debris were reported in the channel in the vicinity of the railroad swing bridge below Mystic.

(274) **Special anchorages** are in Mystic Harbor. (See **110.1, 110.50b, and 110.50d**, chapter 2, for limits and regulations.)

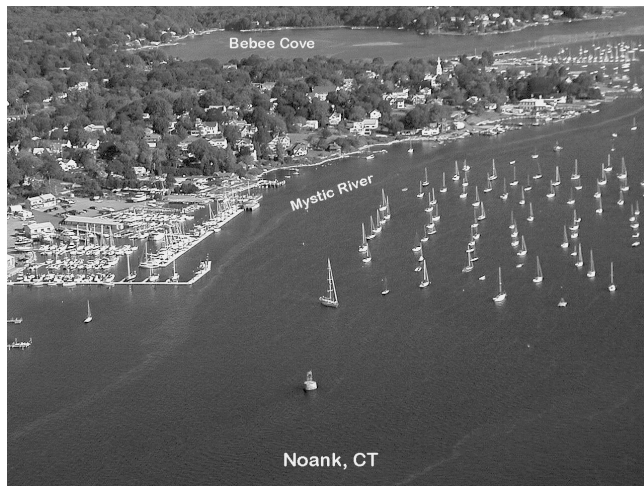
(275) **Routes**.—To enter from eastward, lay a west-northwesterly course from south of the lighted bell buoy marking Napatree Point Ledge for a little over 3 miles to about 400 yards south of the buoy marking the south end of **Cormorant Reef**. From here steer 261° for the abandoned light tower on Morgan Point in range with the north end of the northern rocky islet off the north end of Ram Island until Mason Point is abeam. Then follow the buoyed channel.

(276) From westward, proceed cautiously from about 100 yards or more southward of the buoy southward of Groton Long Point on an easterly course for about 0.5 mile to Mystic Harbor Channel Buoy 1, then steer a northerly course through the buoyed

channel into Mystic Harbor, rounding Noank Light 5 at a distance of about 75 yards.

(277) **Noank** is a town on the west side of the channel through Mystic Harbor. The mean range of the tide is about 2.3 feet. There are several small-craft facilities at Noank and in **West Cove**. Berths, electricity, gasoline, diesel fuel, water, ice, storage facilities, launching ramps, 30-ton mobile lift, and marine supplies are available; hull, engine, sail, and electronic repairs can be made. A **harbormaster** is at Noank.

(278) **Mystic River** flows into Mystic Harbor from northward just below Mystic. The river is used by recreational craft, the local fishing fleet, and by transient craft visiting Mystic Seaport. An **anchorage area** with depths of 3½ to 7 feet is in the lower



part of the river between Willow Point and Murphy Point. **Ice** usually closes the river during January and February.

(279) **Willow Point**, 0.6 mile below Mystic, has several small-craft facilities that can provide berths, electricity, water, ice, some engine parts, and marine supplies. A 12-ton crane and 30-ton mobile hoist are available; hull and engine repairs can be made.

(280) A channel, privately marked by daybeacons, leads from the vicinity of Willow Point for 0.3 mile in an easterly direction, thence about 0.4 mile northeastward to a marina on the west side of the mouth of **Pequotsepos Brook**, just below the Amtrak railroad bridge. Berths, electricity, water, ice, storage, marine supplies, a 12-ton mobile hoist, and hull and engine repairs are available. In July 1981, a reported depth of 4 feet could be carried in the channel to the marina.

(281) Several small-craft facilities are on the northern end of Mason Island. Berths, electricity, water, ice, storage facilities, marine supplies, 25-ton mobile hoist, and hull and engine repairs are available. In 1993, a reported depth of 4 feet could be carried to the facilities.

(282) The Amtrak railroad bridge over Mystic River below Mystic has a swing span with a clearance of 8 feet. The U.S. Route 1 highway bridge at Mystic has a bascule span with a clearance of 4 feet. (See **117.1 through 117.59 and 117.211**, chapter 2, for drawbridge regulations.) The bridgetenders monitor VHF-FM channel 13; call signs KJA-842 and KXR-912, respectively.

(283) **Mystic**, a town about 2 miles above Noank, has several small-craft facilities. Berths, electricity, gasoline, diesel fuel, water, ice, marine supplies, storage facilities, mobile hoists, and ma-

rine railways up to 110 feet are available; hull and engine repairs can be made. A **harbormaster** is at Mystic.

(284) The **Mystic Seaport Museum** is about 0.6 mile above the highway bridge at Mystic. The whaler CHARLES W. MORGAN, full-rigged training ship JOSEPH CONRAD, and Grand Banks fishing schooner L. A. DUNTON are permanently moored at the museum and open to the public. Along the waterfront of the museum property, a mid-19th Century coastal village has been recreated with shops and lofts of that period. Collections of maritime relics are on exhibit in several formal museum buildings.

(285) Above the Mystic Seaport Museum, the channel is very narrow and is marked by privately maintained seasonal daybeacons; boats of about 5-foot draft can be taken to the **Narrows**, and thence depths are 1 and 2 feet to **Old Mystic**. Twin fixed highway bridges crossing the Narrows have clearances of 25 feet. The stream follows the east bank to the next narrows and the west bank to a marina in the bight about 0.3 mile below Old Mystic.

(286) **Charts 13213, 13212, 13214.**—**Mumford Cove** is entered about 2 miles west of Mystic Harbor. A privately dredged channel leads northward from the entrance to the head of the cove; two spur channels lead eastward from the main channel, about 0.3 mile and 0.6 mile, respectively, above the entrance. The channels are marked by private seasonal buoys and daybeacons. In July 1981, the channels had a reported controlling depth of 2 feet.

(287) **Special anchorages** are in the cove. (See **110.1 and 110.50c**, chapter 2, for limits and regulations.)

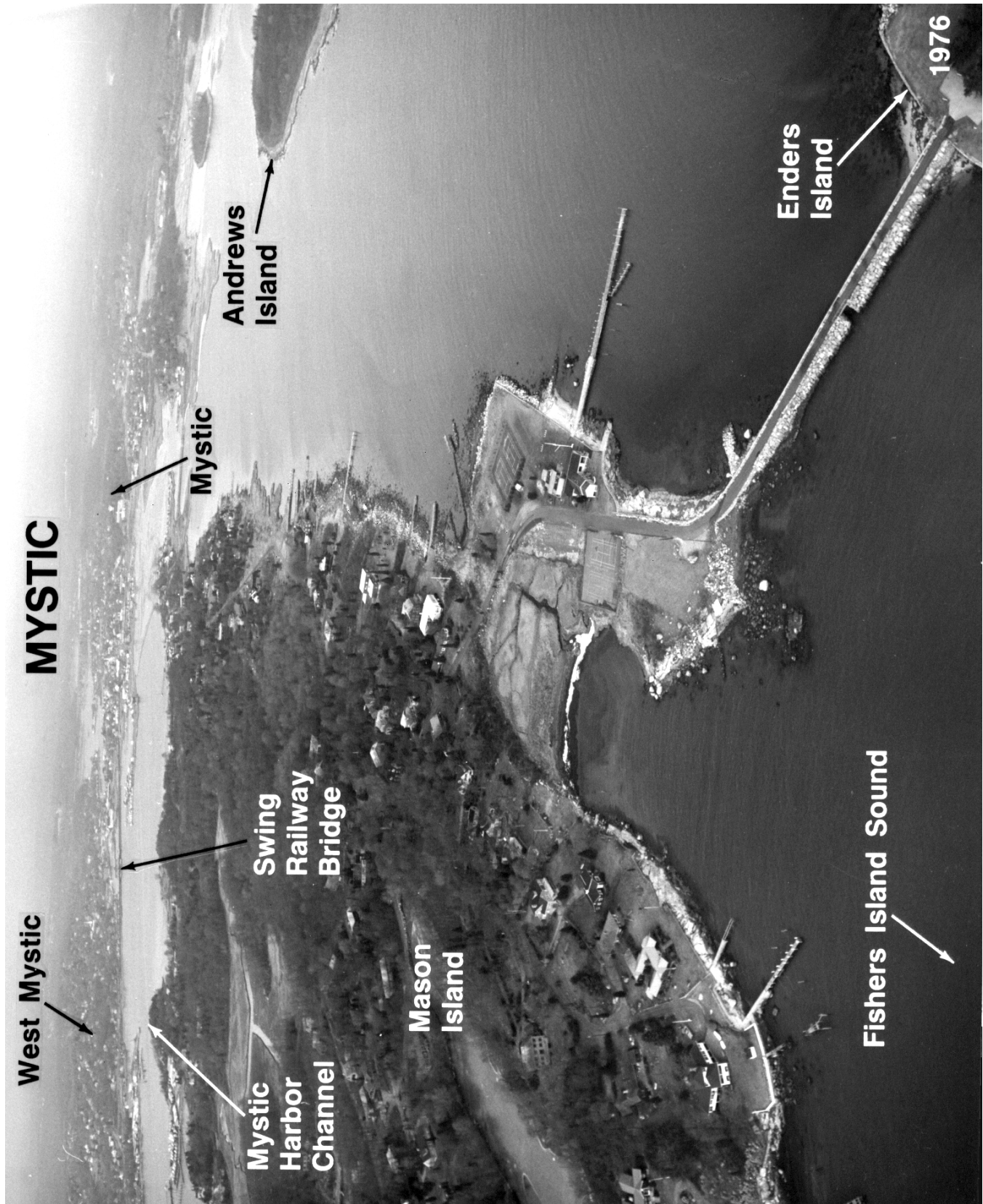
(288) **Venetian Harbor** is a yacht basin on the east side of the entrance to Mumford Cove. A channel 75 feet wide leads through stone breakwaters into a basin with depths of about 3 to 7 feet. A submerged jetty extends along the channel from the outer end of the east breakwater. The entrance to the harbor is marked by a light on the outer end of the west breakwater.

(289) **Horseshoe Reef**, 0.5 mile southward of Mumford Cove entrance, is awash at low water, and is marked by a buoy. Broken and rocky grounds extend from the reef to the shore eastward of Mumford Point.

(290) **Vixen Ledge**, with a depth of 10 feet and marked by a buoy, is about 1 mile west of Horseshoe Reef. **Pine Island** is bluff and grassy, about 1.3 miles west of Mumford Point. It is surrounded by shoal water and rocky bottom, and is marked off the southwest side by a lighted bell buoy. A rock, covered 7 feet, in 41°18'35"N., 72°03'17"W., is about 0.3 mile northwestward of Vixen Ledge.

(291) A **special anchorage** is on the north side of Pine Island. (See **110.1 and 110.51**, chapter 2, for limits and regulations.)

(292) The cove indenting the mainland northward of Pine Island and eastward of **Avery Point**, is entered between Avery Point and westward of Pine Island. The entrance to the cove is marked by two buoys just inside and eastward of Avery Point. Depths shoal from about 10 feet in the entrance to about 1 foot at the head of the cove. A breakwater, marked at its end by a private light, extends southeasterly from the east end of Avery Point. A yacht club, marina, and State launching ramp are in the cove. An unmarked rock awash is about 500 yards 060° from the former lighthouse tower at Avery Point. Berths, guest moorings, gasoline, electricity, water, ice, marine supplies, and a 14-ton mobile hoist are available at the marina; hull and engine repairs can be made. In March 2000, a reported depth of 7½ feet could be carried to the marina.



(293) Special purpose buoys maintained by the City of Groton show a **speed limit** of 5 m.p.h. in the area.

(294) A **special anchorage** is in the cove. (See **110.1** and **110.51**, chapter 2, for limits and regulations.)